## **APPENDIX**

## DATA BANK DESCRIPTION OF THE VARIOUS UNITS OF THE BACK END 20

```
[00148] This appendix provides an exemplary listing of various back-end units.
```

```
COMPANY UNIT
```

```
[00149]
```

```
seq__dapt__company;
           SEQUENCE
DROP
                            dapt__company;
           TABLE
DROP
                                  dapt company
                 TABLE
CREATE
                                              PRIMARY KEY,
                                        INT4
           id
                                        TEXT NOT NULL,
           name
                                              TEXT, NOT NULL,
           street1
                                              TEXT.
           street2
                                        TEXT NOT NULL
            city
                                         TEXT.
            state
                                               NOT NULL
                                        INT4
            zip
                                               NOT NULL
                                         TEXT
            country
                                               NOT NULL
                                         TEXT
            phone
                                         TEXT,
            fax
                                         TEXT.
            email
                                         TEXT.
            www
                                         TEXT,
            resources
                                         INT4 DEFAULT(0),
            contractSequence
```

UNIQUE (name, street1, zip, city)

```
CREATE SEQUENCE seq_dapt_company;
```

[00150] Company addresses can be stored in the data bank. These company addresses can only be viewed, modified, compiled or deleted by the ASP administrator.

ACCESS RIGHTS UNIT

[00151]

```
DROP TABLE dapt_permission;
CREATE TABLE dapt_permission

(
id INT4 PRIMARY KEY,
remark TEXT NOT NULL
```

INSERT INTO dapt\_permission (id,remark) VALUES (0,'ASP Administrator'); INSERT INTO dapt\_permission (id,remark) VALUES (1,'Company Administrator');

```
INSERT INTO dapt_permission (id,remark) VALUES (2,'Customer Advisor');
INSERT INTO dapt_permission (id,remark) VALUES (3, 'Customer User');
EMPLOYEE UNIT
[00152]
                              seq_dapt_employee;
            SEQUENCE
DROP
                              dapt_employee;
            TABLE
DROP
            TABLE dapt employee
CREATE
                                          INT4 PRIMARY KEY,
      id
                        TEXT NOT NULL,
      firstName
                        TEXT NOT NULL,
      lastName
                        TEXT,
      title
                        INT4 REFERENCES dapt_gender(ID) NOT NULL,
      gender id
                        DATE NOT NULL,
      dateOfBirth
                        INT4 REFERENCES dapt_company(id) NOT NULL,
      company_id
                         TEXT
       ident
                         TEXT NOT NULL,
       phone
                               TEXT,
       fax
                         TEXT
       email
                               TEXT
       www
                         TEXT NOT NULL,
       username
                         TEXT NOT NULL.
       password
                         INT4 REFERENCES dapt_permission NOT NULL,
       permission_id
                         DATE DEFAULT CURRENT_DATE,
       create
                         INT4
       lastLogin
                         TEXT,
       sessionKey
       substitute_idINT4 DEFAULT(-1),
                   TEXT.
       iobTitle
       UNIQUE( company_id, username)
                               seq_dapt_employee;
             SEQUENCE
 CREATE
             Each employee is allocated to exactly one company in the company
 [00153]
  unit (company _id). What this allocation controls is that only customer datasets that
  belong to this company are visible. Furthermore, the employee is equipped with
  access rights (permission _id) (see the above description). These access rights
  control what information the employee is offered by the system. Thus, for example,
  an account manager (permission _id=3) cannot view any statistics above the
```

company itself (number of contracts, number of employees, contracts per employee, etc.). In order to enable employees to be represented, a reference to another employee is also maintained. As soon as an employee logs off and defines a representative, all information are also made available to the representative.

[00154] For authentication, every employee is assigned a user name as well as a password. Upon logon to the system, the user is requested to enter the company name as well as user name and the password. The server application checks based on these parameters whether there is a user belonging to the indicated company and subsequently verifies the password. When these unambiguous parameters agree, the employee can be identified. A session key is generated in the data bank that unambiguously identifies the logged on user.

```
BENEFICIARIES
[00155]
            TABLE dapt_beneficiary _mode;
DROP.
                  TABLE dapt _beneficiary _mode
CREATE
                  INT4 PRIMARY KEY,
      id
                        TEXT NOT NULL
      remark
);
 INSERT INTO dapt_beneficiary_mode (id,remark) VALUES (0, 'SINGLE'
 INSERT INTO dapt_beneficiary_mode (id,remark) VALUES (1, 'PAIR'
 INSERT INTO dapt_beneficiary_mode (id,remark) VALUES (2, 'COMPANY' );
                                     seq_dapt_beneficiary;
                   SEQUENCE
 DROP
                                     dapt_beneficiary;
                   TABLE
 DROP
                                     dapt_beneficiary
                    TABLE
 CREATE
                     INT4 PRIMARY KEY,
        id
                     INT4 REFERENCES dapt_customer_mode(id)DEFAULT(0),
        mode_id
                     TEXT NOT NULL.
        firstName
                     TEXT NOT NULL,
        lastName
                     INT4 REFERENCES dapt_gender(ID) NOT NULL,
        title
        gender_id
                     DATE NOT NULL,
        dateOfBirth
                     TEXT ,
        firstName2
                     TEXT
        lastName2
                     TEXT,
         title2
                                                                  SPECIFICATION
```

- 30 -

```
INT4 REFERENCES dapt_gender(ID) DEFAULT(0),
     gender id2
                  DATE DEFAULT CURRENT_DATE.
     dateOfBirth2
     accountNumber INT4 NOT
                             NULL.
                             NOT NULL,
     bankIdentificationCode
                             TEXT NOT NULL,
     bankDetail
                             INT4 REFERENCES dapt company(id) NOT NULL
     company_id
);
CREATE
                 SEQUENCE
                                   seq_dapt_beneficiary;
[00156]
           Payouts of investments can generally be paid out to different accounts
(of the beneficiary). It is thus not only a customer but also a beneficiary that is
assigned to each contract.
CUSTOMER UNIT
[00157]
DROPTABLE dapt_customer_status;
           TABLE dapt_customer_status
CREATE
                        INT4 PRIMARY KEY.
     id
                       TEXT NOT NULL
      remark
);
INSERT INTO dapt customer status (id,remark) VALUES (0, 'REGISTERED'
INSERT INTO dapt_customer_status (id,remark) VALUES (1, 'CONFIRMED'
INSERT INTO dapt customer status (id.remark) VALUES (2, 'CHECKOUT'
INSERT INTO dapt customer status (id,remark) VALUES (3,
'CHECKOUTCONFIRMED'
INSERT INTO dapt customer_status (id,remark) VALUES (4, 'CHANGED');
DROPTABLE dapt_customer__mode;
                  TABLE dapt customer _ mode
CREATE
      id
                 INT4 PRIMARY KEY.
                  TEXT NOT NULL
      remark
);
INSERT INTO dapt_customer_status (id,remark) VALUES (0,'SINGLE'
INSERT INTO dapt customer_status (id,remark) VALUES (1, 'PAIR');
INSERT INTO dapt customer status (id,remark) VALUES (2,'COMPANY);
DROP
            SEQUENCE
                              seq dapt_customer;
```

- 31 -

SPECIFICATION

```
dapt_customer;
DROP
            TABLE
CREATE
            TABLE
                              dapt_customer;
      id
                  INT4
                        PRIMARY KEY,
                        REFERENCES dapt_customer_mode(id) DEFAULT(0),
                  INT4
      mode id
                  TEXT NOT NULL.
      firstName
                  TEXT NOT NULL,
      lastName
      title
                  TEXT
                  INT4 REFERENCES dapt_gender(ID) NOT NULL,
      gender_id
                  DATE NOT NULL,
      dateOfBirth
      firstName2
                  TEXT
      lastName2
                  TEXT
                  TEXT
      title2
                        REFERENCES dapt_gender(ID) DEFAULT(0),
      gender_id2
                  INT4
                  DATE DEFAULT CURRENT_DATE,
      dateOfBirth2
                        REFERENCES dapt_company(id) NOT NULL,
                  INT4
      company_id
                        REFERENCES dapt_team(id)
                                                   NOT NULL,
                  INT4
      team id
                        REFERENCES dapt_customer_status(id) NOT
      status_id
                  INT4
NULL
                  TEXT NOT NULL,
      street1
                         TEXT ,
      street2
                  TEXT
      city
                  TEXT
      state
                  INT4
                        NOT NULL,
      zip
                         TEXT NOT NULL,
      country
                  TEXT
      phone
                  TEXT
      fax
                   TEXT
      email
                  TEXT ,
      www
      accountNumber INT4 DEFAULT(-1),
                  INT4 DEFAULT(-1),
      bankldent
                   TEXT
      bankDetail
                         REFERENCES dapt_employee(id) NOT NULL,
                   INT4
      creator_id
                  DATE NOT NULL,
      createdDate
      createdTime
                  TIME NOT NULL,
                         REFERENCES dapt_employee(id) NOT NULL,
                   INT4
      modifier id
      modifiedDate DATE NOT NULL.
      modifiedTime TIME NOT NULL
);
                   SEQUENCE seq_dapt_customer;
CREATE
```

**UNIT FOR STORING FUND COMPANIES** 

[00158]

```
SEQUENCE seq_dapt_company_address;
DROP
           TABLEdapt_company_address;
DROP
                       dapt_company_address
CREATE
           TABLE
                       PRIMARY KEY,
                 INT4
     company_id INT4 REFERENCES dapt_company(ID) NOT NULL,
                 TEXT NOT NULL
      name
                 TEXT NOT NULL,
      street1
                 TEXT,
      street2
                 TEXT NOT NULL
      city
                 TEXT,
      state
                       INT4 NOT NULL,
      zip
                       TEXT NOT NULL.
      country
                 TEXT NOT NULL,
      phone
                        TEXT,
      fax
                  TEXT,
      email
                        TEXT,
      www
                  TEXT.
      remark
                                                           NULL,
                  INT4, REFERENCES dapt_employee(id) NOT
      creator id
                  DATE NOT NULL,
      createdDate
                 TIME NOT NULL,
      createdTime
                  INT4 REFERENCES dapt_employee(id) NOT NULL,
      modifier id
      modifiedDate DATE NOT NULL,
      modifiedTime TIME NOT NULL
);
                  SEQUENCE seq__dapt_company_address;
CREATE
DEPOSIT UNIT
[00159]
 DROPSEQUENCE seq_dapt_deposit;
                  dapt_deposit;
 DROPTABLE
 CREATE TABLE
                  dapt deposit
                              INT4 PRIMARY KEY,
       id ·
                              INT4 REFERENCES dapt_customer(id) NOT
       customer_id
 NULL,
                              TEXT NOT NULL,
       name
                              INT4 NOT NULL,
       deposit AccountNumber
                                    INT4 NOT NULL.
       bankIdentificationCode
                              TEXT NOT NULL,
       bankDetail
       UNIQUE (customer_id,depositAccountNumber, bankIdentification Code)
 );
             SEQUENCE seq_dapt_deposit;
 CREATE
```

Arbitrary deposits can be assigned to each customer. The deposits are [00160] usually requested by the customer himself in writing in parallel (apart from the system). These written documents are available to the consultant. Securities are booked in this deposit.

```
FEE UNIT
```

[00161]

DROP SEQUENCE seq\_dapt\_fee; dapt fee; DROP TABLE TABLE dapt\_fee CREATE

INT4 PRIMARY KEY

INT4 REFERENCES dapt\_company(id) NOT NULL, company\_id

TEXT NOT NULL, name INT4 NOT NULL, perAnnum

FLOAT NOT NULL,

feeMinimum FLOAT NOT NULL

INT4 REFERENCES dapt\_employee(id) NOT NULL, creator id createdDate DATE NOT NULL, createdTime TIME NOT NULL,

INT4 REFERENCES dapt\_employee(id), modifier id DATE,

modifiedDate TIME. modifiedtime

UNIQUE (name, fee, feeMinimum, perAnnum, company\_id)

CREATE SEQUENCE seq\_dapt\_fee;

Fee models are allocated to each company. These fee models can [00162] contain minimum amounts and can also be marked as fees to be paid annually. Every securing contract is linked to a fee model.

**CONTRACT UNIT** 

[00163]

DROPTABLE dapt\_return\_mode; TABLE dapt\_return\_mode CREATE

INT4

PRIMARY KEY,

- 34 -

```
TEXT NOT NULL
     remark
);
INSERT INTO dapt_return_mode(id,remark) VALUES (0,'ABSOLUTE');
INSERT INTO dapt_return_mode(id,remark) VALUES (1,'RELATIVE');
        TABLE dapt _contract__status;
DROP
           TABLE dapt contract_status
CREATE
                 INT4 PRIMARY KEY.
      id
                 TEXT NOT NULL
      remark
INSERT INTO dapt_contract_status (id,remark) VALUES (0,'REGISTERED'
INSERT INTO dapt_contract_status (id,remark) VALUES (1,'CONFIRMED'
                                                                     );
INSERT INTO dapt_contract_status (id,remark) VALUES (2,'ACTIVATED'
                                                                     ):
INSERT INTO dapt_contract_status (id,remark) VALUES (3,'MONITORED'
                                                                     );
INSERT INTO dapt_contract_status (id,remark) VALUES (4,'TERMINATED'
                                                                     );
INSERT INTO dapt_contract_status (id,remark) VALUES (5,'CHECKOUT'
                                                                     ):
INSERT INTO dapt_contract_status (id,remark) VALUES (6, CHECKOUTCONFIRMED);
                         seq_dapt_team;
            SEQUENCE
DROP :
                         dapt_team;
            TABLE
DROP
                         dapt team
CREATE TABLE
                             INT4 PRIMARY KEY.
      id
                 TEXT
                             DEFAULT('--'),
      name
                             REFERENCES dapt_employed(id) NOT NULL
      advisor id
                 INT4
                             REFERENCES dapt_employed(id) NOT NULL
                 INT4
      user id
      UNIQUE (advisor _id, user_id)
);
CREATE SEQUENCE seq_dapt_team;
DROP SEQUENCE seq_dapt_contract;
 DROPTABLE dapt contract;
 CREATE TABLE dapt_contract
            INT4 PRIMARY KEY,
 id
            INT4 REFERENCES dapt_deposit(id) NOT NULL,
 deposit id
                  INT4 NOT NULL
 nsin
                        INT4 NOT NULL,
 reference
                             REFERENCES dapt_beneficiary(id) NOT NULL,
                  INT4
 beneficiary_id
                        INT4 REFERENCES dapt_team(id) NOT NULL,
 broker_id INT4
                        INT4 REFERENCES dapt_company(id) NOT NULL,
 company_id
                        INT4
 speculativePeriod
                              FLOAT CHECK (numberAssets>=0),
 numberAssets
```

DATE NOT NULL, purchaseDate purchaseTime TIME NOT NULL, FLOAT NOT NULL CHECK (price>=0), purchasePrice FLOAT, activation INT4 REFERENCES dapt\_return\_mode, activationMode\_\_id INT4 activated activationDate DATE NOT NULL, TIME NOT NULL, activationTime FLOAT NOT NULL, safeGuard INT4 REFERENCES dapt\_return\_mode(id), safeGuardMode id safeGuardFee id INT4 REFERENCES dapt\_fee(id) NOT NULL, StoppLoss FLOAT NOT NULL, INT4 REFERENCES dapt\_return\_mode(id), StoppLossMode\_id REFERENCES dapt\_fee(id), StoppLossFee id FLOAT NOT NULL. price NOT NULL, priceDate DATE priceTime TIME NOT NULL, threshold FLOAT NOT NULL, thresholdDate DATE NOT NULL. thresholdTime TIME NOT NULL. INT4 REFERENCES dapt\_contract\_status status id DEFAULT(0), DATE NOT NULL. statusDate statusTime TIME NOT NULL. INT4 REFERENCES dapt\_employee(id)NOT NULL, statusEmployee id

systemReference INT4 NOT NULL, systemDate DATE NOT NULL,

systemTime TIME NOT NULL,

volume FLOAT NOT NULL,

salePrice FLOAT, saleDate DATE, saleTime TIME,

);

contractNumberINT4 DEFAULT (-1)

CREATE SEQUENCE seq\_dapt\_contract;

```
RATE DATA UNIT
[00164]
DROPSEQUENCE seg dapt quote;
DROP TABLE dapt_quote;
CREATE TABLE dapt_quote
     id
                 INT4 NOT NULL,
                 INT4 PRIMARY KEY,
     nsin
                 INT4 NOT NULL.
     reference
     name
                 TEXT NOT NULL,
                 FLOAT NOT NULL CHECK (price>=0),
     price
     date
                 DATE NOT NULL,
     time
                 TIME NOT NULL,
     UNIQUE (id, nsin, reference)
);
CREATE SEQUENCE seq_dapt_quote;
NOTIFICATION UNIT
[00165]
           SEQUENCE seq_dapt_notification;
DROP
           TABLE dapt notification;
DROP
CREATE TABLE dapt_notification
                 INT4 PRIMARY KEY,
     id
                 INT4 REFERENCES dapt_permission(id) NOT NULL,
     target id
     company_id INT4 REFERENCES dapt_company(id) NOT NULL,
                 TEXT NOT NULL,
     message
                 TEXT NOT NULL,
     link
     date
                 DATE NOT NULL,
     time
                 TIME NOT NULL
);
CREATE SEQUENCE seq_dapt_notification;
           Account managers and consultants can themselves activate contracts
```

or customer applications without having to wait for a confirmation of the company

administrator. The company administrator is notified of this bypassing of the actual work sequence with a message.